



Docket: 7213.13

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

First Named Inventor:	Charles N. Serhan	
Application No.:	10/663,061	
Filing Date:	September 12, 2003	Examiner:
Title:	Aspirin-Triggered Lipid Mediators	Group Art Unit:

INFORMATION DISCLOSURE STATEMENT  
UNDER 37 CFR § 1.97(b)

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

I hereby certify that this document is being sent via First Class U.S. mail addressed to:  
Commissioner for Patents, P. O. Box 1450, Alexandria, VA 22313-1450 on this 18<sup>th</sup>  
day of December, 2003

[Signature]  
(Signature)

Dear Sir:

Pursuant to 37 CFR § 1.97(b), the references listed on the attached Form PTO-1449 (1 sheet, submitted in duplicate) are brought to the attention of the Examiner for consideration in connection with the examination of the above-identified patent application. This IDS is being filed before the mailing of a first office action on the merits. In accordance with 37 CFR § 1.97(b), no statement or fee is required.

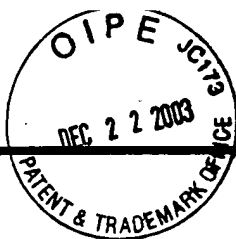
Copies of the references cited are not enclosed, as allowed under 37 CFR § 1.98(d). Each item on the enclosed Form PTO-1449 was cited to, or cited by, the Office in Ser. No. 09/785,866, filed February 16, 2001 to which priority is claimed under 35 U.S.C. § 120, in the present application.

Respectfully submitted,

DORSEY & WHITNEY LLP  
Customer Number 25768

Date: January 17, 2004

By: [Signature]  
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**U.S. PATENT DOCUMENTS**

*Examiner Initials	Cite No.	DOCUMENT NUMBER Number - Kind Code (if known)	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		US- 4,666,701	5/19/1987	Horrobin et al.	
		US- 5,409,955	4/25/1995	Bockow et al.	
		US- 5,411,988	5/2/1995	Bockow et al.	
		US- 5,709,855	1/20/1998	Bockow	
		US- 6,201,022	3/13/2001	Mease et al.	
		US- 4,201,211	5/6/1980	Chandrasekaran et al.	
		US- 5,814,599	9/29/1998	Mitragotri et al.	
		US- 5,846,974	12/8/1998	Kallman et al.	
		US- 4,810,424	3/7/1989	Gerwick, et al.	
		US-			
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**FOREIGN PATENT DOCUMENTS**

*Examiner Initial	Cite No.	FOREIGN PATENT DOCUMENT		Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	TRANSLATION	
		Country Code:	Number - Kind Code (if known)				YES	NO
		WO	91/16914	11/14/1991			<input type="checkbox"/>	<input type="checkbox"/>
		WO	98/46588	10/22/1998			<input type="checkbox"/>	<input type="checkbox"/>
		JP	5186342	7/27/1993	Bunshiyu et al.		<input checked="" type="checkbox"/>	<input type="checkbox"/>
		XP	002184773				<input type="checkbox"/>	<input type="checkbox"/>
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## **OTHER DOCUMENTS - NON-PATENT LITERATURE DOCUMENTS**

*Examiner Initials	Cite No.	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published	TRANSLATION	
			YES	NO
		PCT/US01/05196 International Search Report	<input type="checkbox"/>	<input type="checkbox"/>
		J.W. Karanian et al., "Physiological functions of hydroxy - docosahexaenoic acid", Abstract, XP-002200246, 1993.	<input type="checkbox"/>	<input type="checkbox"/>
		E.M. Hill, et al. "Identification and egg hatching activity of monohydroxy fatty acid eicosanoids in the barnacle Balanus balanoides", Abstract, XP-002200247, 1992	<input type="checkbox"/>	<input type="checkbox"/>
		L. De Montarby, et al. "Synthesis stereoselectives de metabolites hydroxyles d'acides gras polinsatures", Bulletin De La Societe Chimique de France, No. 3, pgs. 419-432, 1989.	<input type="checkbox"/>	<input type="checkbox"/>
		M. Yamane, et al., "Docosahexaenoic/arachidonic acid $\omega$ -hydroxylation system and differentiation in the human clonic adenocarcinoma cell line, Caco-2", Cancer Letters, Vol. 122, pgs. 51-59, 1998.	<input type="checkbox"/>	<input type="checkbox"/>
		T. Kato, et al., "Production of Hydroxy Unsaturated Fatty Acids Using Crude Lipoxygenase Obtained from Infected Rice Plants", Bull. Chem. Soc. Jpn. Vol. 69, pgs. 1663-1666, 1996.	<input type="checkbox"/>	<input type="checkbox"/>
		W.E.M. Lands, "Proceedings of the AOCS Short Course on Polyunsaturated Fatty Acids and Eicosanoids", <i>American Oil Chemists' Society</i> 1987.	<input type="checkbox"/>	<input type="checkbox"/>
		M. Ligo et al., "Inhibitory effects of docosahexaenoic acid on colon carcinoma 26 metastasis to the lung", <i>Br. J. Cancer</i> , 1997, pgs. 650-655.	<input type="checkbox"/>	<input type="checkbox"/>
		G.E. Billman et al., "Prevention of sudden cardiac death by dietary pure $\omega$ -3 polyunsaturated fatty acids in dogs", <i>Circulation</i> 99 1999, pgs. 2452-2457.	<input type="checkbox"/>	<input type="checkbox"/>
		A.P. Simopoulos, "Workshop on the essentiality of an recommended dietary intakes for omega-6 and omega-3 fatty acids", <i>J. Am. Coll. Nutr.</i> 1999, pgs. 487-489.	<input type="checkbox"/>	<input type="checkbox"/>
		R. Marchioloi, "Dietary supplementation with n-3 polyunsaturated fatty acids and vitamin E after myocardial infarction: results of the GISSI-Prevenzione trial", <i>Lancet</i> 1999, pgs. 447-455.	<input type="checkbox"/>	<input type="checkbox"/>

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			YES	NO
		G. Weissmann, "Aspirin", <i>Sci. Am.</i> 1991, pgs. 84-90.	<input type="checkbox"/>	<input type="checkbox"/>
		A.J. Marcus, "Platelets: their role in hemostasis, thrombosis, and inflammation", <i>Inflammation: Basic Principles and Clinical Correlates</i> 1999, pgs. 77-95.	<input type="checkbox"/>	<input type="checkbox"/>
		J. Claria et al., "Aspirin triggers previously undescribed bioactive eicosanoids by human endothelial cell-leukocyte interactions", <i>Proc. Natl. Acad. Sci. USA</i> 1995, pgs. 9475-9479.	<input type="checkbox"/>	<input type="checkbox"/>
		C.N. Serhan et al, "Design of lipoxin A4 stable analogs that block transmigration and adhesion of human neutrophils", <i>Biochemistry</i> 1995, pgs. 14609-14615.	<input type="checkbox"/>	<input type="checkbox"/>
		N. Chiang et al., "Leukotriene B4 receptor transgenic mice reveal novel protective roles for lipoxins and aspirin-triggered lipoxins in reperfusion", <i>J. Clin. Invest.</i> 1999, pgs. 309-316.	<input type="checkbox"/>	<input type="checkbox"/>
		H.R. Herschman, "Recent progress in the cellular and molecular biology of prostaglandin synthesis", <i>Trends Cardiovasc. Med.</i> 1998, pgs. 145-150.	<input type="checkbox"/>	<input type="checkbox"/>
		P. Needleman et al., "The discovery and function of COX-2", <i>J. Rheumatol</i> 1997, pgs. 6-8.	<input type="checkbox"/>	<input type="checkbox"/>
		N. Chiang et al., "Aspirin-triggered 15-epi-lipoxin A4 (ATL) generation by human leukocytes and murine peritonitis exudates: Development of a specific 15-epi-LXA4 ELISA", <i>J. Pharmacol. Exp. Ther.</i> 1998, pgs. 779-790.	<input type="checkbox"/>	<input type="checkbox"/>
		G. Xiao et al., "Analysis of hydroperoxide-induced tyrosyl radicals and lipoxygenase activity in aspirin-treated human prostaglandin H synthase-2", <i>Biochemistry</i> 1997, pgs. 1836-1845.	<input type="checkbox"/>	<input type="checkbox"/>
		K. Node et al., "Anti-inflammatory properties of cytochrome P450 epoxygenase-derived eicosanoids", <i>Science</i> 1999, pgs. 1276-1279.	<input type="checkbox"/>	<input type="checkbox"/>
		S. Sethi et al., "Inhibition of phagocyte-endothelium interactions by oxidized fatty acids: A natural anti-inflammatory mechanism?", <i>J. Lab. Clin. Med.</i> 1996, pgs. 27-38.	<input type="checkbox"/>	<input type="checkbox"/>

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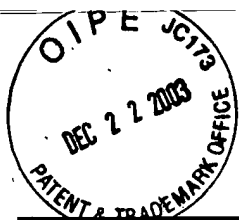
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			YES	NO
		G.N. Levy, "Prostaglandin H synthases, nonsteroidal anti-inflammatory drugs, and colon cancer", <i>FASEB J.</i> 1997, pgs. 234-247.	<input type="checkbox"/>	<input type="checkbox"/>
		K. Gronert, et al., "Transcellular regulation of eicosanoid biosynthesis", <i>Eicosanoid Protocols</i> 1999, pgs. 119-144.	<input type="checkbox"/>	<input type="checkbox"/>
		H.J. George et al., "Expression purification and characterization of recombinant human inducible prostaglandin G/H synthase from baculovirus-infected insect cells", <i>Protein Express. Purif.</i> 1996, pgs. 19-26.	<input type="checkbox"/>	<input type="checkbox"/>
		J.H. Capdevila et al., "The highly stereoselective oxidation of polyunsaturated fatty acids by cytochrome P450BM-3", <i>J. Biol. Chem.</i> 1996, pgs. 22663-22671.	<input type="checkbox"/>	<input type="checkbox"/>
		R.T. Ruettinger et al., "Epoxidation of unsaturated fatty acids by a soluble cytochrome P-45-dependent system from bacillus megaterium", <i>J. Biol. Chem.</i> 1981, pgs. 5728-5734.	<input type="checkbox"/>	<input type="checkbox"/>
		T.H. Lee et al., "Characterization and biologic properties of 5,12-dihydroxy derivatives of eicosapentaenoic acid, including leukotriene B5 and the double lipoxygenase product", <i>J. Biol. Chem.</i> 1984, pgs. 2383-2389.	<input type="checkbox"/>	<input type="checkbox"/>
		C.N. Serhan et al., "Nomenclature of lipoxins and related compounds derived from arachidonic acid and eicosapentaenoic acid", <i>Prostaglandins</i> 1987, pgs. 201-204.	<input type="checkbox"/>	<input type="checkbox"/>
		D.J. Hill et al., "Trout thrombocytes contain 12-but not 5-lipoxygenase activity", <i>Biochim. Biophys. Acta</i> 1999, pgs. 63-70.	<input type="checkbox"/>	<input type="checkbox"/>
		B.N. Cronstein et al., "A mechanism for the anti-inflammatory effects of corticosteroids: The glucocorticoid receptor regulates leukocyte adhesion to endothelial cells and expression of endothelial-leukocyte adhesion molecule 1 and intercellular adhesion molecule 1", <i>Proc. Natl. Acad. Sci.</i> 1992, pgs. 9991-9995.	<input type="checkbox"/>	<input type="checkbox"/>
		T. Yokomizo et al., "A G-protein-coupled receptor for leukotriene B4 that mediates chemotaxis", <i>Nature</i> 1997, pgs. 620-624.	<input type="checkbox"/>	<input type="checkbox"/>
		M.R. Buchanan et al., "Regulation of endothelial cell and platelet receptor-ligand binding by the 12- and 15-lipoxygenase monohydroxides, 12-, 15-HETE and 13-HODE", <i>Prostaglandins Leukot. Essent. Fatty Acids</i> 1998, pgs. 339-346.	<input type="checkbox"/>	<input type="checkbox"/>

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			YES	NO
		P.M. Ridker et al., "Inflammation, aspirin, and the risk of cardiovascular disease in apparently healthy men", <i>N. Engl. J. Med.</i> 1997, pgs. 973-979.	<input type="checkbox"/>	<input type="checkbox"/>
		Communication Relating to the Results of the Partial International Search	<input type="checkbox"/>	<input type="checkbox"/>
		Takeshi Terano, Ensho, Chemical Abstract 107:22439, pp. 63-71, 1987.	<input type="checkbox"/>	<input type="checkbox"/>
		Miller et al., Lipids, Chemical Abstract 112:117062, pp. 998-1003, 1989.	<input type="checkbox"/>	<input type="checkbox"/>
		Hill, EM. Proc R. Soc. London Ser. B., 247 (1318) pp 41-46, 1992.	<input type="checkbox"/>	<input type="checkbox"/>
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